

A

# PATENT ABSTRACTS OF JAPAN

(11)Publication number : 10-328297

(43)Date of publication of application : 15.12.1998

(51)Int.CI.

A61M 1/12

(21)Application number : 09-144130

(71)Applicant : BUAYU:KK

(22)Date of filing : 02.06.1997

(72)Inventor : SHITSU RIYOUHEI

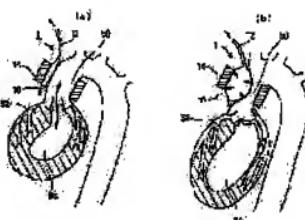
MITSUMARU ATSUHIRO

## (54) HEART FUNCTION ASSISTING DEVICE

### (57)Abstract:

**PROBLEM TO BE SOLVED:** To provide a heart function assisting device which can execute blood pressure assistance by applying pressure from outside a blood vessel without being inserted into the blood vessel.

**SOLUTION:** A heart function assisting device 1 includes a balloon 10, a tube 12, and a holder 14, and expands the balloon 10 during the expansion period of the heart to compress the ascending aorta 50 from outside to heighten blood pressure therein, thereby increasing the amount of blood flow to the coronary artery 52 in (b). During the contraction period of the heart, the balloon 10 is contracted to lessen compression of the ascending aorta 50 to lower the blood pressure therein, thus reducing, through the effects of negative pressure, the resistance to the sending out of blood from the left ventricle 54 to the ascending aorta 50, and reducing the work of the left ventricle 54 in (a). Once the patient has recovered, the heart function assisting device 1 is removed. In this case the balloon 16, the tube 12, and the like are extracted from within the patient's body with the holder 14 left behind in the body.



### LEGAL STATUS

[Date of request for examination] 31.05.2004

[Date of sending the examiner's decision of rejection]

[Kind of final disposal of application other than the examiner's decision of rejection or application converted registration]

[Date of final disposal for application]

[Patent number]

[Date of registration]

[Number of appeal against examiner's decision of rejection]

[Date of requesting appeal against examiner's decision of rejection]